

WHAT IS CLAIMED IS:

1. A treatment system for providing electromagnetic therapy and massage comprising,

- (a) an electromagnetic field inductor for producing an electromagnetic field, and
- (b) at least one magnetic ball, said magnetic ball having a central magnet core covered in a substantially nonmagnetic material,

wherein said electromagnetic field is capable of causing said at least one magnetic ball to move freely and randomly within said electromagnetic field so as to massage a body part placed within said electromagnetic field.

2. The system of claim 1, wherein said electromagnetic field has a maximal induction of 200 Gauss.

3. The system of claim 1, wherein said electromagnetic field is pulsed.

4. The system of claim 1, wherein said electromagnetic field is intermittent.

5. The system of claim 1, wherein said electromagnetic field is alternating in polarity.

6. The system of claim 5, wherein said electromagnetic field alternates in polarity with a frequency of 50 to 60 Hertz.

7. The system of claim 5, wherein said electromagnetic field alternates in polarity with sinusoidal oscillations.

8. The system of claim 1, wherein said body part is of an animal.

9. The system of claim 1, wherein said body part is of a human.

10. The system of claim 1, wherein said body part is a body.

11. The system of claim 1, wherein said body part is a limb.
12. The system of claim 1, wherein said at least one magnetic ball is a plurality of magnetic balls.
13. The system of claim 1, wherein said at least one magnetic ball is spherical.
14. The system of claim 1, wherein the shape of said at least one magnetic ball is selected from the group consisting of cube, cylinder, cone, pyramid, rectangular prism, and irregular polyhedral solid.
15. The system of claim 1, wherein said at least one magnetic ball has at least one projection extending from a surface of said at least one magnetic ball.
16. The system of claim 1, wherein said substantially nonmagnetic material is soft.
17. The system of claim 1, wherein said substantially nonmagnetic material is hard.
18. The system of claim 1, wherein said substantially nonmagnetic material is selected from the group consisting of plastic, rubber, silicone epoxy, foam rubber and fabric.
19. The system of claim 1, further comprising:
 - (c) a housing, said housing comprising at least one wall and a base surface, said at least one wall and said base surface enclosing a bath, wherein said electromagnetic field inductor surrounds said bath, and said at least one magnetic ball moves freely and randomly within said bath.
20. The system of claim 19, further comprising:
 - (d) a cover above said bath, said cover having a passage therein for insertion of said body part.

21. The system of claim 20, wherein said cover is transparent.
22. The system of claim 1, wherein said electromagnetic field inductor is circular.
23. The system of claim 1, wherein said electromagnetic field inductor is located within a housing mounted on a stand, said housing having a central aperture adapted to enable insertion of said body part.
24. The system of claim 23, where the position of said electromagnetic field inductor on said stand may be adjusted.
25. The system of claim 23, wherein said housing has a lining rest.
26. The system of claim 1, wherein said at least one magnetic ball is contained within a sleeve, said sleeve being adapted so as to be placeable around said body part.
27. The system of claim 26, wherein said sleeve has a plurality of chambers, each of said plurality of chambers having an enclosure sack with at least two portions, said first portion in contact with said body part, and a second part attached to said first part.
28. The system of claim 27, wherein said first portion of said enclosure sack is soft, and said second portion is firmer than said first portion.
29. The system of claim 26, wherein said sleeve has at least one vent for changing said at least one magnetic ball therein.
30. The system of claim 26, wherein said sleeve is transparent.
31. The system of claim 1, further comprising:
 - (c) a control element for automated operation of the system.

32. The system of claim 31, wherein said control element is programmable, such that at least one parameter of said operation of the system may be changed by an operator of the system.

33. The system of claim 32, wherein said at least one parameter is selected from the group consisting of maximal intensity of said electromagnetic field, pulse cycle time, pause time, and total treatment duration.

34. The system of claim 32, wherein said at least one parameter may be changed using at least one remote program input device connected to said control element by at least one communication channel.

35. The system of claim 34, wherein said at least one communication channel is selected from the group consisting of a telephone connection, a cellular telephone connection, an infrared connection, a satellite connection, cables connection, an Internet connection, a local area network connection and a radio frequency connection.

36. The system of claim 31, wherein said control element is adapted to perform an emergency stop.

37. The system of claim 36, further including a remote input device for causing said control element to perform said emergency stop.

38. The system of claim 37, wherein said remote input device conveys input to said control element by a means selected from the group consisting of electrical impulses traveling along a wire, wireless transmission, sonic transmission, infrared transmission, ultrasound transmission, microwave transmission and radio frequency transmission.

39. The system of claim 31, wherein said control element is adapted so as to prevent operation of the system if at least one safety parameter is exceeded.

40. The system of claim 39, wherein said at least one safety parameter is selected from the group consisting of inductor temperature and current intensity.

41. The system of claim 1, wherein the system is used for the treatment of vascular disease.

42. The system of claim 1, wherein the system is used for the treatment of inflammatory conditions.

43. The system of claim 1, wherein the system is used for the treatment of pain.